

ABSTRACT OF THE DISCLOSURE

The present invention relates to improvements in drill slip assemblies for use in holding a drill pipe or other tubular member in a vertical position above or within a wellbore. The invention comprises a plurality of slip segments assembled in a slip bowl, each segment containing a plurality of dies which grip the tubular member to prevent any axial displacement. The invention provides at least three improvements over prior art drill slips. First, the outer surface of the slip segment assembly, particularly the lower nose region, is fully supported by the inner surface of the slip bowl such that no portion of the slip segment assembly extends below the bowl. Second, the slip segments are fabricated from forged steel, making them more durable and able to carry higher loads. Third, each die in the lowermost set of hardened dies is fabricated having a rounded bottom end with a tapered profile to complement the rounded bottom of the axial grooves cut into each slip segment.